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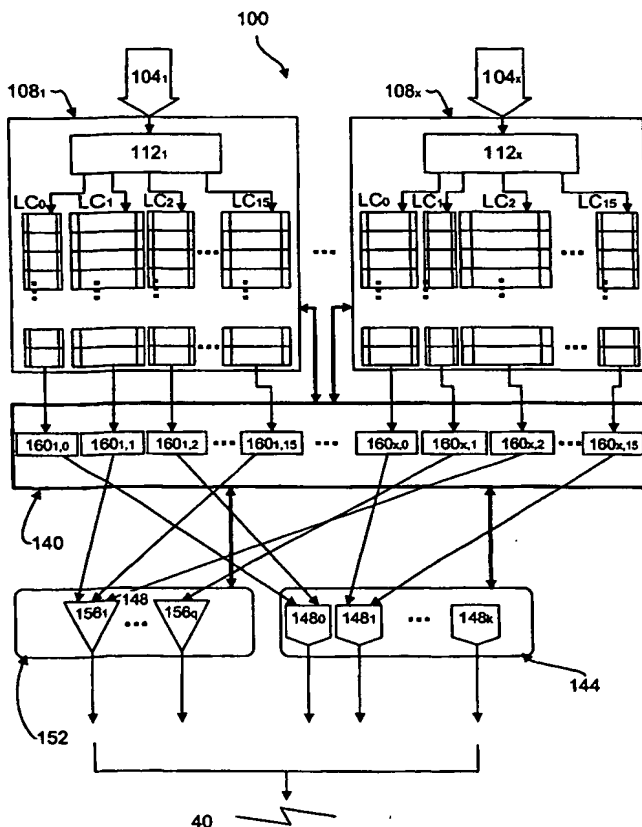
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(54) Title: APPARATUS, SYSTEM AND METHOD FOR THE TRANSMISSION OF DATA WITH DIFFERENT QOS ATTRIBUTES



(57) Abstract: A novel apparatus, system and method for transmitting data flows having different quality of service (QoS) attributes over a network link structured in two or more channels is provided. The method classifies arriving packets to determine their required/assigned QoS attributes and places the classified packets into one of several logical channel queues, the selected logical channel queue having an appropriate corresponding set of QoS attributes defined. A radio link controller examines the available channels and, for each channel, selects a logical channel queue whose contents will be transmitted thereon. The radio link controller determines the data transmission capacity for each channel and segments the contents of the selected logical channel to fit within the determined capacity. The selection of the logical channel queue is performed in accordance with the set of QoS attributes and thus each flow can have different QoS characteristics including priorities, reliabilities (ARQ, no ARQ, etc.).